RECEIVED
CENTRAL FAX CENTER
OCT (2 2000

CLAIM AMENDMENTS

This listing of claims replaces all prior versions, and listings, of claims in the application:

- 1. (Currently amended) An apparatus for reducing radio frequency interference in a system that includes a radio receiver, the apparatus comprising:
 - a requantizer for outputting a requantized signal based on an input signal;
 - a first <u>finite impulse response (FIR)</u> filter of a first order, said first <u>FIR</u> filter for receiving said requantized signal and outputting a first filtered signal;
 - a second <u>FIR</u> filter of a second order higher than the first order, said second <u>FIR</u> filter for receiving said requantized signal and outputting a second filtered signal;
 - a selection means for selecting one of the first and second <u>FIR</u> filters, wherein when said radio receiver is not in use, said second <u>FIR</u> filter is selected, and when said radio receiver is in use, said first <u>FIR</u> filter is selected; and an a first adder for adding the output of the selected <u>FIR</u> filter to said input signal.
- 2. (Currently amended) The apparatus of claim 1, wherein said apparatus is a variable-order noise shaper, wherein said noise shaper is of an order corresponding to an order of the selected <u>FIR</u> filter.
- 3. (Original) The apparatus of claim 1, wherein said radio receiver is an amplitude modulation (AM) tuner.
- 4. (New) The apparatus of claim 1, further comprising a second adder, wherein the second adder produces a second adder output by subtracting a noise shaper output from an output of the first adder and sends the second adder output to the selected filter.
- 5. (New) The apparatus of claim 1, wherein the input signal is a digital signal received at a digital amplifier from an analog to digital converter.

Attorney Docket No.: 1087-APOG14

Page 3 of 6

U.S. App. No.: 10/826,732